

17

reading the binary data elements, and wherein the step of evaluating includes tracing a frame portion of the bit-map image of the first elements to determine the orientation, tracing synchronization line portions of the bitmap image of the first elements to identify intersections of the synchronization lines, and then determining the locations of the binary data elements from the intersection locations. 5

9. A method of graphically storing binary data in a condensed, high-density, machine-readable form, comprising the steps of 10

printing on a selected medium a pattern of information-carrying graphic elements defining a geometric reference system including a plurality of synchronization lines defining boundaries of an enclosed data field and a frame surrounding the synchronization lines, the 15

18

frame including a plurality of machine-readable marks identifying the pattern as a data-field reference system, and substantially filling the data field with a plurality of binary data-transmission elements each characterized by the presence or absence of a machine-readable mark at each of a plurality of binary data element locations located next to each other with no spaces between said locations, each binary data element location having a known geometric relationship to the reference system so that coordinates of each of the plurality of individual binary data elements can be determined.

10. A method according to claim 9 wherein said selected medium is a sheet of paper and wherein said binary data elements and said reference system are printed concurrently.

* * * * *